## PATENT SPECIFICATION

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(21) Application No. 31266/72

(22) Filed 4 July 1972

(23) Complete Specification Filed 5 June 1973

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# (54) HAND TOOL COMPRISING A HANDLE AND REMOVABLE BLADE

#### PATENTS ACT 1949

#### SPECIFICATION NO 1375934

The following amendments were allowed under Section 29 on 17 December 1975

Page 1, lines 80, 83 and 85, page 2, lines 3 and 4, delete 26 insert 29

Page 1, line 81, delete 26 extends insert 29 and a button 26 extend

Page 1, line 88, ufter blade delete full stop insert . by pressing on the button 26

Page 2, line 7, delete 29

Page 2, line 22, after spigot insert 29, button

THE PATENT OFFICE 2 Feburary 1976

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at least partly resilient so that it can be
25 forced out of interlock with the blade for
removal of the blade, the said part of the
handle comprising a spigot and a resilient
cantilever from which the spigot extends, the
blade having an aperture or cut-out therein
30 through which the spigot extends, the cantilever extending part-way along the handle
from near said one end thereof, where the
cantilever is joined to the body of the
handle.

35 Preferably the cantilever engages one side of the blade so as to bias an opposite side of the blade against one or more channel-defining portions of the handle.

Preferably the handle comprises a body 40 having opposite side surfaces between which there extends a through-cavity in which said at least partly resilient part is wholly confined without projecting beyond either of the opposite side surfaces.

Preferably the blade is one of a plurality

elevation of a fourth blade for fitting to the handle of Figures 1 to 4; and

Figure 11 is an enlarged side elevation of a guard, shown in phantom in Figures 8 and 9, for the blade of Figures 8, 9 and 10.

Referring now to the drawings, the handle 20 illustrated in Figures 1 to 4 is in one 75 piece of moulded plastics material. The handle 20 has a channel 21 to receive any one of the blades 22 to 25 illustrated in Figures 5 to 10. The handle 20 also has a spigot 26 and a resilient cantilever 27 from 80 which the spigot 26 extends as shown, to interlock positively with the blade by extension of the spigot 26 through an aperture or cut-out 28 in the blade. Due to the resilience of the cantilever 27, the spigot 26 can be forced out of the aperture or cut-out 28 and hence out of interlock with the blade, for removal of the blade. When the blade is inserted, it initially deflects the spigot until the blade has been inserted suffi-90

SPECIFICATION AMENDED - SEE ATTACHED SLIP

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#### (54) HAND TOOL COMPRISING A HANDLE AND REMOVABLE BLADE

We, STANLEY TOOLS LIMITED, a British Company, of Woodside, Sheffield S3 9PD., do hereby declare the invention, for which we pray that a patent may be granted 5 to us, and the method by which it is to be performed, to be particularly described in and by the following statement:-

This invention relates to a hand tool comprising a handle and one or more removable

10 blades.

A particular application of the invention is to a multi-purpose hand tool for use by the amateur "handyman" for home decora-

According to the invention there is provided a hand tool comprising an elongate handle and a blade, the handle being in one piece of moulded plastics material and having firstly a channel extending part-way

20 along the handle from one end thereof to receive the blade and secondly a part which is adapted to interlock positively with the blade so as to retain the blade and which is at least partly resilient so that it can be

25 forced out of interlock with the blade for removal of the blade, the said part of the handle comprising a spigot and a resilient cantilever from which the spigot extends, the blade having an aperture or cut-out therein

30 through which the spigot extends, the cantilever extending part-way along the handle from near said one end thereof, where the cantilever is joined to the body of the handle.

Preferably the cantilever engages one side of the blade so as to bias an opposite side of the blade against one or more channeldefining portions of the handle.

Preferably the handle comprises a body 40 having opposite side surfaces between which there extends a through-cavity in which said at least partly resilient part is wholly confined without projecting beyond either of the opposite side surfaces.

Preferably the blade is one of a plurality

of blades which are inter-changeable and are of different shapes for performing respective functions and which are each attachable to the handle in a substantially identical

The invention will be described by way of example with reference to the drawings filed with the provisional specification. In the drawings:-

Figure 1 is a plan view of a handle of a 55 hand tool in accordance with the invention

from one side of the handle;

Figure 2 is an underneath plan view of

the handle of Figure 1;
Figure 3 is a section on line III-III in 60

Figure 1;

Figure 4 is a section on line IV-IV in

Figure 1;

Figures 5, 6 and 7 are plan views of three different blades for fitting to the handle of 65 Figures 1 to 4; Figures 8, 9 and 10 are respectively a

plan view, a side elevation and an end elevation of a fourth blade for fitting to the handle of Figures 1 to 4; and

Figure 11 is an enlarged side elevation of a guard, shown in phantom in Figures 8 and 9, for the blade of Figures 8, 9 and 10.

Referring now to the drawings, the handle 20 illustrated in Figures 1 to 4 is in one 75 piece of moulded plastics material. The handle 20 has a channel 21 to receive any one of the blades 22 to 25 illustrated in Figures 5 to 10. The handle 20 also has a spigot 26 and a resilient cantilever 27 from 80 which the spigot 26 extends as shown, to interlock positively with the blade by extension of the spigot 26 through an aperture or cut-out 28 in the blade. Due to the resilience of the cantilever 27, the spigot 26 85 can be forced out of the aperture or cut-out 28 and hence out of interlock with the blade, for removal of the blade. When the blade is inserted, it initially deflects the spigot until the blade has been inserted suffi- 90

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ciently far along the channel 21 for the aperture or cut-out 28 to come into register with the spigot 26, whereupon the cantilever 27 snaps the spigot 26 into the aperture or cut-5 out 28. To hold the blade firmly in position, the cantilever 27 is formed with a normally canted surface 29 which engages one side of the blade so as to bias an opposite side of the blade against two inwardly project-10 ing handle parts 30 which partly define the channel 21.

The handle 20 is elongate, as shown, the channel 21 extending part-way along the handle from one end 31 of the handle to an 15 end face 32. The cantilever 27 also extends part-way along the handle from near the end 31, the cantilever 27 being joined to the body of handle 20 near the end 31.

The handle 20 comprises a body 33 having 20 opposite side surfaces 34 and 35, between which there extends a through-cavity 36 in which the spigot 26 and cantilever 27 are wholly confined without projecting beyond either of the side surfaces 34 and 35, as 25 shown in Figure 3.

Each of the blades 22 to 25 is formed of sheet metal and has an identical stem 37 in which the aperture or cut-out 28 is formed and which is dimensioned to fit the 30 channel 21. In other respects, each of the blades 22 to 25 is of generally conventional form. Figures 8, 9 and 11 illustrate a guard 38 which can be fitted over the teeth 39 of the blade 25.

WHAT WE CLAIM IS:—

1. A hand tool comprising an elongate handle and a blade, the handle being in one piece of moulded plastics material and 40 having firstly a channel extending part-way along the handle from one end thereof to

receive the blade and secondly a part which is adapted to interlock positively with the blade so as to retain the blade and which is at least partly resilient so that it can be 50 forced out of interlock with the blade for removal of the blade, the said part of the handle comprising a spigot and a resilient cantilever from which the spigot extends, the blade having an aperture or cut-out 55 therein through which the spigot extends, the cantilever extending part-way along the handle from near said one end thereof, where the cantilever is joined to the body of the handle.

2. A hand tool as claimed in Claim 1, wherein the cantilever engages one side of the blade so as to bias an opposite side of the blade against one or more channel-defining portions of the handle.

3. A hand tool as claimed in claim 1 or 2 wherein the handle comprises a body having opposite side surfaces between which there extends a through-cavity in which said at least partly resilient part is wholly con-70 fined without projecting beyond either of the opposite side surfaces.

4. A hand tool as claimed in any pre-

4. A hand tool as claimed in any preceding claim wherein the blade is one of a plurality of blades which are interchangeable 75 and are of different shapes for performing respective functions and which are each attachable to the handle in a substantially identical manner.

5. A hand tool substantially as described 80 with reference to the drawings filed with the provisional specification.

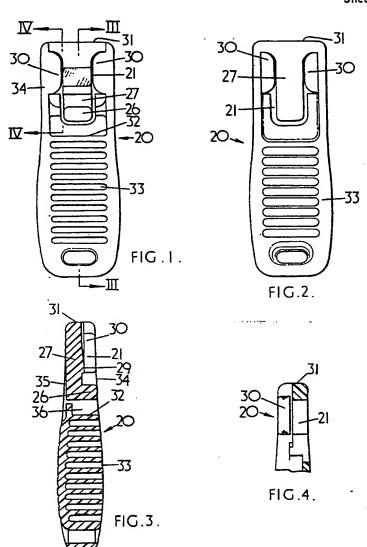
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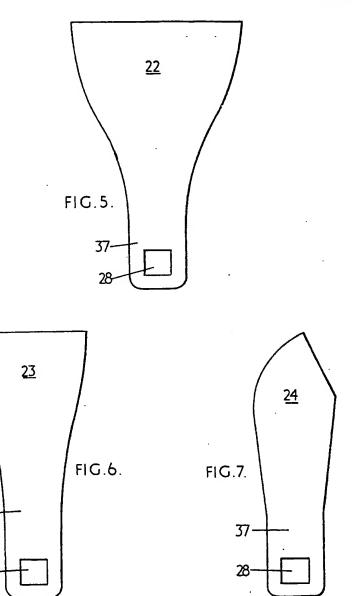
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Sheet 1



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